

number only amounts to from 120–160. The filaments are otherwise strong, full of glands, and often tongue-shaped or swollen like a club at their free end, 2–3 mm. long, 10–14 mm. thick.

The gastral openings (figs. 3, 6, *go*) are four horizontal transverse fissures, 4 mm. in breadth, which lie at the distal end of the four cross limbs of the bottom of the stomach and lead from it into the coronal sinus (*cs*). The upper lip, or the upper (umbral) margin of the transverse fissure, is somewhat concave and formed by a slightly projecting ridge of the endodermal wall of the gelatinous umbrella. The lower lip, or the lower (subumbral) margin of the gastral opening, on the other hand, is slightly convex, and formed by a thickened crescentic ridge of the subumbrella (at the proximal margin of the coronal sinus (figs. 3, 6, *go*). This lower lip can fall like a valve over the other and so shut off the coronal sinus from the œsophagus; it corresponds to the perradial pouch lobes of the Cubomedusæ. The two lateral oral angles of the gastral openings are bounded by the darkly-pigmented ridges of insertion or roots of the genital fulcra ("sterigmata," *st*, fig. 3).

The peripheric coronal intestine of *Atolla*, which only communicates with the central principal intestine by the four narrow perradial gastral openings, resembles that of *Nausithoë* and *Nauphanta* on the one hand, and that of *Periphylla* and *Periphema* on the other. It is divided into two sections, the proximal coronal sinus and the distal corona of pouches, by a subumbral circular furrow, corresponding exactly to the exumbral coronal furrow (*ec*), and is only separated from it by the thinnest part of the gelatinous umbrella (*ec*). The large coronal sinus ("sinus coronaris," fig. 3, *ec*) corresponds to the narrower sinus of *Nauphanta* (Pl. XXVIII. fig. 14, *cs*) and the broader sinus of *Periphylla* (Pls. XX.–XXII., *cs*). Whilst, however, in both these species it stands vertically (with an upper and lower margin and an inner and outer surface), in *Atolla* it has assumed a horizontal position (with an inner and outer margin and an upper and lower surface), corresponding to the strong depression of the discoid umbrella. It forms here a circular hollow space, 6–7 mm. broad and 1–2 mm. high. The upper or umbral wall of the coronal sinus forms the flat endodermal surface of the corona of teeth of the central gelatinous disk; it also shows externally a fine coronal furrow, from which numerous fine radial indentations project centripetally inwards (fig. 3, *zw*). The lower or subumbral wall forms the genital zone of the subumbrella, which is composed of the eight broad adradial genitalia and the eight narrow deltoid muscles alternating with them, four smaller perradial (*md'*) and four broader interradian (*md''*). The inner or axial margin of the coronal sinus is formed by the four perradial gastral openings (through which it communicates with the central stomach) and by the four abaxial baselines of four interradian septal plates (*kt*) alternating with these. The external or abaxial margin is composed of the tangential transverse fissures by which the pouches of the corona of pouches open into the coronal sinus.